FAX COPY RECEIVED

7 2001 MAY

SCHWEGMAN ■LUNDBERG ■ WOESSNER ■ KLUTH RX & COPYRIGHT ATTORNEYS

P.O. Box 2938

Minneapolis, MN 55402 Telephone (612) 373-6900

Facsimile (612) 339-3061

May 7, 2001

Time:

11:05 am

(Minneapolis, Minn.)

TO:

Commissioner for Patents

Attn: Karabi Guharay

Patent Examining Corps

Facsimile Center

Washington, D.C. 20231

FROM: David C. Peterson

OUR REF: 303.537US1

TELEPHONE: (612) 373-6944

FAX NUMBER <u>(703) 746-4822</u>

* Please deliver to Examiner Karabi Guharay in Art Unit 2879. *

Document(s) Transmitted: Signed copy of previously filed Amendment and Response (7 pgs.)

Total pages of this transmission, including cover letter: 8 pgs

If you do NOT receive all of the pages described above, please telephone us at 612-373-6900, or fax us at 612-339-3061.

In re. Patent Application of: Ii Ung Lee

Examiner: Karabi Guharay

Serial No.: 09/145,595

Group Art Unit: 2879

Filed: September 2, 1998

Docket No.: 303.537US1

Title: FIELD EMISSION DEVICES HAVING STRUCTURE FOR REDUCED EMITTER

TIP TO GATE SPACING

Please charge any additional fees or credit overpayment to Deposit Account No. 19-0743.

Reg. No.: Reg. No. 47,857

I hereby certify that this paper is being transmitted by facsimile to the U.S. Patent and Trademark Office on the date shown below.

Tina M. Pugh

EXPEDITED PROCEDURE - EXAMINING GROUP 2879

S/N 09/145,595 PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant:

Ji Ung Lee

Examiner: Karabi Guharay

Serial No.:

09/145,595

Group Art Unit: 2879

Filed:

September 2, 1998

Docket: 303.537US1

Title:

FIELD EMISSION DEVICES HAVING STRUCTURE FOR REDUCED

EMITTER TIP TO GATE SPACING

AMENDMENT & RESPONSE UNDER 37 C.F.R. § 1.116

Box AF Commissioner for Patents Washington, D.C. 20231

In response to the Final Office Action mailed February 22, 2001, please amend the application as follows:

IN THE CLAIMS

Please add the following new claims:

- 47. (New) A field emitter array, comprising:
 - a number of cathodes in rows along a substrate;
- a gate insulator located along the substrate and surrounding the cathodes, the gate insulator having a gate line region thickness;
- a number of gate lines coupled to the gate insulator, wherein a gate to cathode distance between a portion of the gate line and the cathode is substantially thinner than the gate line region thickness; and
 - a number of anodes located in columns orthogonal to and opposing the rows of cathodes.
- 48. (New) The field emitter array of claim 47, wherein the number of cathodes include polysilicon cones.
- 49. (New) The field emitter array of claim 47, wherein the number of gate lines include refractory metals.